

ENGLISH PROFICIENCY AND PARTICIPATION IN ONLINE DISCUSSION FOR LEARNING

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ABSTRACT

Does English proficiency affect participation in online discussion? This study polled 14 students from a postgraduate online course that require online discussion. The students are divided into groups according to their home language spoken and self-assessed English proficiency, and measure against their participation level in the required discussion forums. It is found that students who speak English at home posts more and longer, and students who rate themselves proficient in English post more and longer. However, literature suggests that factors affecting participation are multi-faceted. Although the current findings suggest a significant correlation between English proficiency and participation level, more work is required to understand the mechanism of the effects of language proficiency in online discussion participation.

KEYWORDS

Online Discussion, Discussion Forums, Participation in Online Discussion, Language Proficiency

1. INTRODUCTION

Many educators recognize the merits of discussion to enhance learning experience (e.g., Andresen, 2009). In online learning environment, instructors may opt for asynchronous text-based forums to accommodate learners from different time zones. However, asynchronous online discussion still requires active participation. If most students do not participate, it is difficult to know whether any conclusion or consensus drawn from the participating minority is meaningful to everyone else.

One obvious reason that affects participation is the language used in the forums. As most of Western colleges deliver their courses in English, English has to be the primary, if not the only, communication medium in online discussion forums. Students must be able to write good English to participate. The language barrier is not a trivial question. According to the Institute of International Education (2013), in 2011/2012 the number of Chinese and Korean students in the US is over 260,000. In Canada, Chinese and Korean students comprise 41% of all international students, up to a number of more than 99,000 (Canadian Bureau for International Education, 2013). It is not clear how many of these students are taking courses that require online discussion. Nevertheless, if an instructor is expecting a significant number of East Asian students, it will be helpful to predict how they will participate in online discussion, given their higher chances of facing the language barrier.

English proficiency is commonly assessed by standard tests, although the outcome of proficiency can be demonstrated in informal settings, including discussion forums. In other words, if a student writes well in discussion forums, he is proficient in English; if he is proficient in English, he writes well in the discussion forums. However, knowing about the proficiency of students *after* the discussion will not help educators to implement online forums. Instead of measuring English proficiency by collecting standard tests scores, this study select a couple of indicators that *predict* the proficiency, and by measuring the relationship between the indicators and participation level, it is hoped to help practitioners to implement discussion forums in online education environment.

2. RELATED STUDIES

Research of participation in asynchronous online discussion is abundant, but with very diverse conclusions. It is suggested that effective participation are related to the design of the forums (Bassett, 2010), mediation and roles of instructors (Vlachopoulos & Cowan, 2010), types of tasks, intervention strategies (Andresen, 2009), learner characteristics (Yukselturk, 2010) and cognitive profile (Vercellone-Smith, Jablokow & Friedel, 2012).

Evidence on the effects of English proficiency, however, is inconclusive. Chen, Bennett and Maton (2008) reported a case study of two ethnic Chinese students in an Australian university. Although both participants are certified English teachers in mainland China, they reported frustration and fear when communicating with their instructor and fellow students through the discussion forums. Their perception led to unsatisfactory learning experience and outcomes. Similarly, Liu, Liu, Lee and Magjuka (2010) studied a group of Chinese students who took several online courses offered by a large Midwestern university in USA, and concluded that “language is still a dominant barrier for students who have English as a Second Language” (p. 186). In a qualitative study of the writings of non-native English speakers, Cronje (2009) concluded that the lack of presentation and communication skills is an essential problem.

On the other hand, Bassett (2010) studied a group of students consisted of both English-as-a-second-language students and native English speaking students. He did not highlight the language proficiency as a prominent issue, but suggested that organization of the course is the most important factor contributing to effective online discussion. Earl and Cong (2011) gave an account of eight Chinese students who took online courses offered by New Zealand universities. While the students agreed that the language barrier is important, they preferred the asynchronous discussion format which gave them the time to edit their posts. Campbell (2007) studied a mixed group of students and noticed that the English-as-a-second-language students participate less in online discussion. However, he addressed to the issue to their personality or shyness instead of their language proficiency.

3. METHODOLOGY

3.1 Background

The target group of the study is the students who enrolled in the winter semester of a postgraduate project management course offered by a Canadian University. The project management course implemented two mandatory online discussion sessions. In each of the forums, students are required to initiate one post and respond to two other posts. The posts contribute up to 10% of the total grade. There is no bonus if students post more than required.

3.2 Measurement

It is important to operationalize and measure the two key concepts of the study - *participation level* and *predicted English language proficiency*. The measurement, however, is not without problem. More can be found in the Discussion section.

Participation level measures how intense a student joins the discussion forums. The more posts and the more words they wrote, the more intense they participate. To quantify for participation level, I used two indicators - the number of posts students made and the number of words they wrote. Students' posts and words are counted and matched to their response in the questionnaire.

English proficiency is the ability to use a language to communicate with others. The indicators selected are the primary language spoken at home (home language), and a self-assessment of written English proficiency (self-assessed proficiency). Self-assessed proficiency is categorized into five categories: “Excellent”, “Good”, “Fair”, “Unsatisfactory” and “Poor”. In this study, the categories “Excellent” and “Good”, which reflects a certain level of confidence in using the English language, is classified as the proficient group. Respondents with “Fair”, “Unsatisfactory” and “Poor” are classified as the non-proficient group.

3.3 Sampling and Data Collection

There are a total of 15 students enrolled in the project management course. All students are invited to take part in the study when the course started. A questionnaire is developed to collect data. To avoid any possible effects of feeling coerced to give favorable answers, the questionnaire is released after all the grades are finalized. All 15 students returned the questionnaire. However, one student did not complete the survey and his response is removed from the study, and gives a total of 14 valid responses.

4. HYPOTHESES

Since there are two predictors of English proficiency (home language and self-assessed proficiency), and two indicators of participation level (number of posts, and number of words written), I have the following four hypotheses:

- (H1) Students who speak English at home write more posts.
- (H2) Students who speak English at home write longer posts.
- (H3) Students who rate themselves proficient in English write more posts.
- (H4) Students who rate themselves proficient in English write longer posts.

5. RESULTS AND CONCLUSION

Table 1 lists the average number of posts and words written by the students, breaking down by home language and self-assessed proficiency. The average of number of posts the student made is 6.07, and the average number for English speaking and non-English speaking groups are 12.89 and 7.17 respectively. All students write an average of 1990 words in both forums. The average number of words for English speaking and non-English speaking group is 2558 and 1139 respectively.

Table 1. Average Number of Posts and Words by Home Language and Self-Assessed Proficiency

| | Average number of posts | Average number of words |
|-------------------------------------|-------------------------|-------------------------|
| All respondents | 10.6 | 1990 |
| Home language | | |
| <i>Speak English at home</i> | 12.89 | 2558 |
| <i>Do not speak English at home</i> | 7.17 | 1139 |
| t-value | 1.73 (not significant) | 2.36 (significant) |
| Self-assessed proficiency | | |
| <i>Excellent / Good</i> | 12.25 | 2329 |
| <i>Fair / Unsatisfactory / Poor</i> | 4 | 638 |
| t-value | 8.25 (significant) | 3.17 (significant) |

Two tailed t-tests are used to compare the differences between groups. As shown in Table 1, the t-value between English speaking and non-English group for number of posts (Hypothesis 1) is 1.73 with a level of confidence of 0.1066. The t-value for number of words (Hypothesis 2) is 2.36 with a level of significance of 0.0347. The t-value between the self-assessed proficient group and the non-proficient group in terms of number of posts (Hypothesis 3) is 8.25 with a level of confidence of 0.0149. The t-value for number of words (Hypothesis 4) is 3.17 with a level of confidence of 0.0074.

In summary, the data support all four of the hypotheses, i.e., it is found that students who speak English at home write more and longer posts, and students who rate themselves proficient in English write more and longer posts. The result for Hypothesis 1, however, is not statistical significant, while the results for Hypotheses 2, 3 and 4 are significant.

6. DISCUSSION

6.1 Limitations

The first limitation of the study is the sampling method. Although the data support all hypotheses, we cannot generalize the results to other group of students because of the non-probabilistic sampling procedure. Another limitation is the small sample size and the biased demographics of the samples. All respondents in the survey are male adults over the age of 21. All of them have some experience in online courses, but many of them do not participate in other discussion forums outside of their study. Both limitations may be rectified by larger scale study. For example, Thompson (2011) polled 287 students from four graduate business courses over a span of two years, with a conclusion of a multi-dimensional model of reasons of participation. A future study of similar scale with focus on language proficiency may yield more convincing results.

A third limitation of the study is the measurement of participation. While we measure participation level in terms of number of posts and number of words written, both indicators only focus on the quantitative aspect of participation. Many studies employed coding schemes to measure the relevance and quality of the posts. For example, studies on Community on Inquiry usually involve encoding of transcripts to measure the three presences (Garrison & Arbaugh, 2007). However, if we hypothesize that language proficiency may have an impact on participation, we need to consider for any linguistic bias on the encoding scheme.

Finally, the grouping of the self-assessed proficiency is arbitrary. While it is possible to use the rating of each response as cardinal data, it is not easy to justify that the distance between each of the response is the same. For sample, the magnitude between “Good” and “Excellent”, and between “Unsatisfactory” and “Poor” may not be the same. Interestingly, all the respondents in the “Fair/Unsatisfactory/Poor” group speak the same East Asian language at home. It may reflect a certain pattern of self-assessment of this country. An alternative to the classification scheme is to use Pearson’s coefficient to measurement the correlation. The coefficient between self-assessed proficiency and number of posts is 0.36, and number of words is 0.43 respectively. Both show positive relationships. However, as mentioned in the Methodology section, it is hard to argue that the distance between Poor and Unsatisfactory, and between Excellent and Good, is equal.

6.2 Factors Affecting Participation

The current study concludes that there is a significant relationship between language proficiency and participation level. However, it is difficult to interpret the relationship given other evidences suggesting a complex web of factors affecting participation. To recapitulate from the Related Studies section, these factors include the demographics of learners (e.g., gender), pedagogy (e.g., mandatory or voluntary participation, active or inactive instructor intervention), social presence, and learner characteristics. The positive relationship between language proficiency and participation level may be but one of the many factors that affect the participation level.

Given the various conclusions, there remains a question of how various factors interact with each other. For example, a latter study of the infamous Community of Inquiry model that the three elements – social, cognitive and teaching presence, may affect each other and progress over time (Akyol & Garrison, 2009). By the same token, is language proficiency modifies or interact with the three presences as well as other factors and affect participation? The question may be addressed through one of two approaches: (1), a large scale serial survey to collect enough data so that we can control significant variables, or, (2) an in-depth case study or focus group study that evaluate the process of participation of selected learners. In either case, further study is important to understand the nature of the role of language proficiency in participation level of online discussion for learning.

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REFERENCES

Akyol, Z., & Garrison, D. R., 2009. The development of a community of inquiry over time in an online course: Understanding the progression and integration of social, cognitive, and teaching presence. *Journal of Asynchronous Learning Networks*, Vol 12, No. 3-4, pp 3 - 22.

Andresen, M. A., 2009. Asynchronous discussion forums: success factors, outcomes, assessments, and limitations. *Educational Technology & Society*, Vol. 12, No. 1, pp 249 – 257.

Bassett, P., 2011. How do students view asynchronous online discussion as a learning experience? *Interdisciplinary Journal of E-Learning and Learning Objects*, Vol. 7, pp 69 – 77.

Campbell, N., 2007. Bringing ESL students out of their shells: Enhancing participation through online discussion. *Business Communication Quarterly*, March 2007, pp 37 – 43.

Canadian Bureau for International Education, 2013. Facts and figures. Retrieved from <http://www.cbie-bcei.ca/about-ie/facts-and-figures/> at April 20, 2013.

Chen, R. T. H., Bennett, S., and Maton, K., 2008. The adaptation of Chinese international students to online flexible learning: two case studies. *Distance Education*, Vol. 29, No. 3, pp 207 – 323.

Cronje, J. C., 2009. Qualitative assessment across language barriers: An action research study. *Educational Technology & Society*, Vol. 12, No. 2, pp 69 – 85.

Earl, K. and Cong, Y., 2011. Chinese international students' experience of studying online in New Zealand. *Waikato Journal of Education*, Vol. 16, No. 1, 93 – 106.

Garrison, D. R., and Arbaugh, J. B., 2007. Researching the community of inquiry framework: Review, issues, and future directions. *Internet and Higher Education*, Vol. 10, pp 157 – 172.

Institute of International Education, 2013. International students: leading places of origin. Retrieved from <http://www.iie.org/en/Research-and-Publications/Open-Doors/Data/International-Students/Leading-Places-of-Origin/2010-12> at April 16, 2013.

Liu, X., Liu, S., Lee, S., and Magjuka, J., 2010. Cultural differences in online learning: International student perceptions. *Educational Technology & Society*, Vol. 13, No. 3, pp 177 – 188.

Thompson, E. W., 2011. *Adult learner participation in computer-mediated communication: Performance, satisfaction, and reasons for participation*. ProQuest, UMI Dissertation Publishing.

Vercellone-Smith, P., Jablokow, K., and Friedel, C., 2012. Characterizing communication networks in a web-based classroom: Cognitive styles and linguistic behavior of self-organizing groups in online discussions. *Computers & Education*, Vol. 59, pp 222 – 235.

Yukselturk, E., 2010. An investigation of factors affecting student participation level in an online discussion forum. *The Turkish Online Journal of Educational Technology*, Vol. 9, No. 2, pp 24 – 32.

Vlachopoulos, P. and Cowan J., 2010. Reconceptualising moderation in asynchronous online discussions using grounded theory. *Distance Education*, Vol. 31, No. 1, pp 23 – 36.